

COMMUNICABLE DISEASE CENTER

# POLIOMYELITIS

## SURVEILLANCE



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- NEWS RELEASE - OCTOBER 2, 1962

U. S. DEPARTMENT OF  
HEALTH, EDUCATION, AND WELFARE  
PUBLIC HEALTH SERVICE

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# PREFACE

Summarized in this report is information received from State Health Departments, university investigators, virology laboratories and other pertinent sources, domestic and foreign. Much of the information is preliminary. It is intended primarily for the use of those with responsibility for disease control activities. Anyone desiring to quote this report should contact the original investigator for confirmation and interpretation.

Contributions to the Surveillance Report are most welcome. Please address to:  
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## SUMMARY

A total of 72 cases of poliomyelitis, 54 paralytic, were reported for the two weeks period which ended on September 29, 1962. The comparable two weeks in 1961 showed a total of 143 cases, 77 paralytic. The continued low incidence of the disease in 1962 is reflected in both cumulative and seasonal (six weeks) totals.

Of the 21 States noting cases during these two weeks, Texas has accounted for the largest number with 10 cases. A report dealing with the 1962 experience with poliomyelitis in this State is presented in Section 2.

Section 3 presents an analysis by age and vaccination status of the 1962 cases reported to the Poliomyelitis Surveillance Unit on individual case forms. In Section 4, surveillance data on cases occurring within 30 days of vaccine administration are listed.

The experience of the viral diagnostic laboratories of Yale University and the Baylor University Medical Center in Dallas with non-poliomyelitis enteroviruses in 1962 are presented in Section 5.

Appended is the news release which followed a meeting of the Surgeon General's special oral polio vaccine advisory committee on October 2, 1962.

### 1. CURRENT POLIOMYELITIS MORBIDITY TRENDS

The two-week period ending on September 29, brought reports of 72 cases of poliomyelitis, 54 paralytic. The cases were from 21 States. During the previous two weeks 59 cases, 46 paralytic, were noted. The totals remain well below the comparable two week period in 1961 which accounted for 143 cases, 77 paralytic.

Twenty-one States reported cases during these two weeks. The largest number of cases have stemmed from Texas with 10 cases, Alabama with 8 cases, and Indiana and Illinois with 6 cases each. No case concentrations have been noted in any of these States, except in Alabama where a significant number of Type I cases have occurred in and around Mobile. (See PSU Report No. 267, September 7, 1962) Because Texas has accounted for 219 of the 604 cases of poliomyelitis reported thus far this year, a summary report of that State's 1962 experience is presented in Section 2.

The 1962 incidence remains well below the totals reported for any previous year. This is illustrated in the tabulations below showing total cumulative and six weeks incidence for 1962 and the preceding 4 years.

#### Polio (Cumulated Weekly) through 39th Week for Past Five Years

	<u>1962</u>	<u>1961</u>	<u>1960</u>	<u>1959</u>	<u>1958</u>
Paralytic	471	594	1573	4055	1860
Total	604	923	2290	6337	3818

Six-Week Totals (34th thru 39th Week) for Past Five Years

	<u>1962</u>	<u>1961</u>	<u>1960</u>	<u>1959</u>	<u>1958</u>
Paralytic	170	272	699	1854	1025
Total	214	441	1066	2936	2127

2. STATE REPORTS

A. Texas

With 10 cases of poliomyelitis including 5 paralytic reported from Texas during the two-week period ending September 29, this State's current totals stand at 219 cases of which 167 are paralytic. The Texas experience in 1962 and in the past four years is shown below. The total number of paralytic cases through the 39th week markedly exceeds the number of paralytic cases in 1960 and 1961. (Texas to date has accounted for 35 percent of the nation's 471 paralytic cases this year.)

Paralytic Polio in Texas for Past Four Years

	<u>1962</u>	<u>1961</u>	<u>1960</u>	<u>1959</u>	<u>1958</u>
Thru 39th Week	167	28	84	274	253
Complete Year	-	37	118	325	423

Of the 167 paralytic cases in 1962, 145 cases where county residence was reported are represented on the map on page 10. Six counties have reported 7 or more cases: Bexar (San Antonio), Dallas, Frio, Harris (Houston), Lubbock, and Webb (Laredo) Counties. Thirty-two Type I polioviruses have been isolated from the cases of these six counties.

The shaded portions of the map designate areas where known mass community programs with Type I oral polio vaccine were held. Guadalupe, Bexar, Frio, LaSalle, Webb, Zapata Counties carried out their mass feedings during late May and early June while the remaining counties vaccinated their citizens during late July and early August.

The Poliomyelitis Surveillance Unit has received individual case forms on 129 of the 167 paralytic cases through October 2. These cases are shown below by age group and history of immunization with inactivated vaccine. Seventy-nine percent of the 0-4 age group have been unvaccinated. As is indicated, 60% of all cases occurred in this age group.

Polio (Cumulative Weekly) through 39th Week for Past Five Years

	<u>1962</u>	<u>1961</u>	<u>1960</u>	<u>1959</u>	<u>1958</u>
Paralytic	471	594	1573	4052	1860

**Paralytic Poliomyelitis by Age Groups and Vaccination  
History Reported on PSU Forms, Texas, 1962  
(Through October 2, 1962)**

Age Group	Doses of Inactivated Vaccine					Total	Percent
	0V	1-2V	3V	4+V	Unk.		
0-4	60	15	1	1	0	77	59.7
5-9	18	1	3	5	0	27	20.9
10-14	6	1	1	0	0	8	6.2
15-19	4	1	0	0	0	5	3.9
20-29	4	0	0	0	0	4	3.1
30-39	3	0	0	0	0	3	2.3
40+	3	1	0	0	1	5	3.9
<b>TOTAL</b>	<b>98</b>	<b>19</b>	<b>5</b>	<b>6</b>	<b>1</b>	<b>129</b>	<b>100.0</b>
<b>PERCENT DOSES</b>	<b>76.6</b>	<b>14.8</b>	<b>3.9</b>	<b>4.7</b>	<b>-</b>	<b>100.0</b>	

The histogram on page 11 shows the 127 cases in which the date of onset was recorded.

**3. 1962 PARALYTIC CASES REPORTED TO PSU**

Of the 471 cases of paralytic poliomyelitis reported through the week ending September 29, 450 had onset in 1962. The Poliomyelitis Surveillance Unit has received individual case forms on 359 of the 450 paralytic cases. The vaccination status of the 359 paralytic cases by age group is shown below.

**Paralytic Poliomyelitis by Age Group  
And Vaccination History Reported on PSU Forms  
(Through October 1, 1962)**

Age Group	Doses of Inactivated Vaccine					Total	Percent
	0V	1-2V	3V	4+V	Unk.		
0-4	123	30	9	10	11	183	51.0
5-9	31	8	9	17	3	68	18.9
10-14	15	4	8	4	1	32	8.9
15-19	10	2	4	2	0	18	5.0
20-29	16	5	3	3	3	30	8.4
30-39	9	2	0	2	1	14	3.9
40+	11	1	0	1	1	14	3.9
<b>TOTAL</b>	<b>215</b>	<b>52</b>	<b>33</b>	<b>39</b>	<b>20</b>	<b>359</b>	<b>100.0</b>
<b>PERCENT DOSES</b>	<b>63.4</b>	<b>15.3</b>	<b>9.7</b>	<b>11.5</b>	<b>-</b>	<b>100.0</b>	

Of the 172 cases with known vaccination history in the 0-4 age group, 123 (71.5 percent) had not received any poliomyelitis vaccinations.

To date in 1962, the Poliomyelitis Surveillance Unit has received results of virological studies on 167 of the 359 paralytic cases. Poliovirus isolations have been made in 139 (83.2 percent) of the 167 cases. Of these, 110 are Type I and 29 are Type III poliovirus. Isolates have been reported from the following States:

State	Poliovirus			Total
	I	II	III	
Alabama	2	0	0	2
Arizona	2	0	0	2
Arkansas	1	0	0	1
California	4	0	7	11
Colorado	1	0	0	1
Georgia	2	0	1	3
Illinois	8	0	2	10
Kentucky	8	0	1	9
Louisiana	4	0	1	5
Massachusetts	2	0	0	2
Michigan	3	0	3	6
Minnesota	4	0	0	4
Mississippi	0	0	1	1
Montana	1	0	0	1
Nebraska	0	0	1	1
New York	7	0	2	9
Ohio	4	0	4	8
Oregon	0	0	3	3
Pennsylvania	4	0	1	5
Tennessee	1	0	0	1
Texas	49	0	2	51
Utah	1	0	0	1
West Virginia	1	0	0	1
Wyoming	1	0	0	1
<b>TOTAL</b>	<b>110</b>	<b>0</b>	<b>29</b>	<b>139</b>

#### 4. ROUTINE POLIOMYELITIS SURVEILLANCE - 1962

##### A. Cases With Onset Within 30 Days of Vaccine (Inactivated)

During the two week period ending September 29, one case of poliomyelitis within 30 days following vaccination has been reported to the Poliomyelitis Surveillance Unit. This case, a 4 year old male from Oakland County, Michigan had onset of a paralytic illness on August 11, 10 days after receiving inactivated vaccine. There was no correlation between site of injection and site of paralysis.

Thus far in 1962, 12 under 30-day cases have been reported. Nine of these have had paralysis. There has been no correlation between site of injection and site of paralysis in any of these cases. Only 2 cases have occurred outside of epidemic areas.

#### B. Cases With Onset Within 30 Days of Vaccine (Oral)

Six cases of poliomyelitis, 5 paralytic, occurring among persons who had received oral polio vaccine within 30 days of onset of illness were reported to the Poliomyelitis Surveillance Unit on individual case forms within the past two weeks. The five paralytic cases were reported from Nebraska and had received Type III oral polio vaccine within the stated interval. Four of these cases were described in a State report on Nebraska in PSU Report No. 268, September 21, 1962. It should be noted that the inactivated vaccine status stated for case Nebraska 4 is in error and should read 4 doses of inactivated vaccine rather than 0.

A detailed listing of the six cases is shown below:

<u>State</u>	<u>County</u>	<u>Age</u>	<u>Sex</u>	<u>IPV</u>	<u>Onset</u>	<u>Date</u>	<u>Type</u>	<u>Onset</u>	<u>Paralytic</u>
						<u>Fed</u>	<u>Fed</u>	<u>Interval</u>	<u>Status</u>
New York	Erie	5	M	6	7-14	6-26	I	18	NP
Nebraska	Douglas	18	F	5	7-1	6-24	III	8	P
Nebraska	Douglas	51	M	0	7-16	6-24	III	28	P
Nebraska	Dodge	37	M	0	7-23	7-8	III	15	P
Nebraska	Phelps	48	F	4	8-16	7-28	III	19	P
Nebraska	Lincoln	57	M	0	8-22	8-5	III	17	P

Thus far in 1962, 36 cases have been submitted to the Poliomyelitis Surveillance Unit on case forms as occurring within 30 days of receiving oral polio vaccine. Nineteen of these have occurred outside of epidemic areas. Of these 19, 3 have occurred following Type I feeding (including the non-paralytic New York case reported in the present issue), one following Type II and 15 following Type III.

#### 5. ENTEROVIRUS SURVEILLANCE

Dr. G.D. Hsiung, Director, Virus Diagnostic Laboratory, Yale University School of Medicine has reported 18 non-poliomyelitis enterovirus isolations on specimens obtained in July and August. Sixteen of these were shown to be ECHO 4 and accompanied illness ranging from a non-specific febrile illness to the aseptic-meningitis syndrome. The age range of the patients involved was from 6 months to 40 years with 13 of the 18 patients being 6 to 16 years of age.

Four ECHO 4 and one ECHO 9 isolates have been recovered by the viral laboratory of the Baylor University Medical Center in Dallas and reported by Dr. A.M. Behbehani. These viruses were found in patients becoming ill during the recent epidemics of poliomyelitis and aseptic meningitis in that city.

These reports have been incorporated into the non-poliomyelitis enterovirus reports from the States of Texas and Connecticut, and will appear in the enterovirus table in the next Poliomyelitis Surveillance Report.



Thus far in 1962, 12 under 30-day cases have been reported. Nine of these have had paralytic. There has been no correlation between site of infection and site of paralytic in any of these cases. Only 3 cases have occurred outside of epidemic areas.

B. Cases With Onset Within 30 Days of Vaccine (Total)

Six cases of poliomyelitis, 5 paralytic, occurring among persons who had received oral polio vaccine within 30 days of onset of illness were reported to the Polio Surveillance Unit on individual case forms within the past two weeks. The five paralytic cases were reported from Nebraska and had received Type III oral polio vaccine within the stated interval. Four of these cases were described in a State report on Nebraska in PSU Report No. 262, September 21, 1962. It should be noted that the inactivated vaccine status stated for case Nebraska 4 is in error and should read 4 doses of inactivated vaccine rather than 0.

A detailed listing of the six cases is shown below:

State	County	Age	Sex	IPV	Onset	Date Type	Onset Interval	Paralytic Status
New York	Eric	5	M	6	7-14	6-26 I	18	NP
Nebraska	Douglas	18	F	5	7-1	6-24 III	8	NP
Nebraska	Douglas	21	M	0	7-16	6-24 III	28	NP
Nebraska	Dodge	37	M	0	7-23	7-8 III	15	NP
Nebraska	Elk	48	F	4	8-16	7-28 III	19	NP
Nebraska	Lincoln	27	M	0	8-22	8-2 III	14	NP

Thus far in 1962, 36 cases have been submitted to the Polio Surveillance Unit on case forms as occurring within 30 days of receiving oral polio vaccine. Nineteen of these have occurred outside of epidemic areas. Of these 19, 3 have occurred following Type I feeding (including the non-paralytic New York case reported in the present issue), one following Type II and 15 following Type III.

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Figure 1

# CURRENT U.S. POLIO INCIDENCE COMPARED WITH YEARS 1957, 1959 and 1961 April - December, by week

DATA PROVIDED BY NATIONAL OFFICE OF VITAL STATISTICS AND COMMUNICABLE DISEASE CENTER

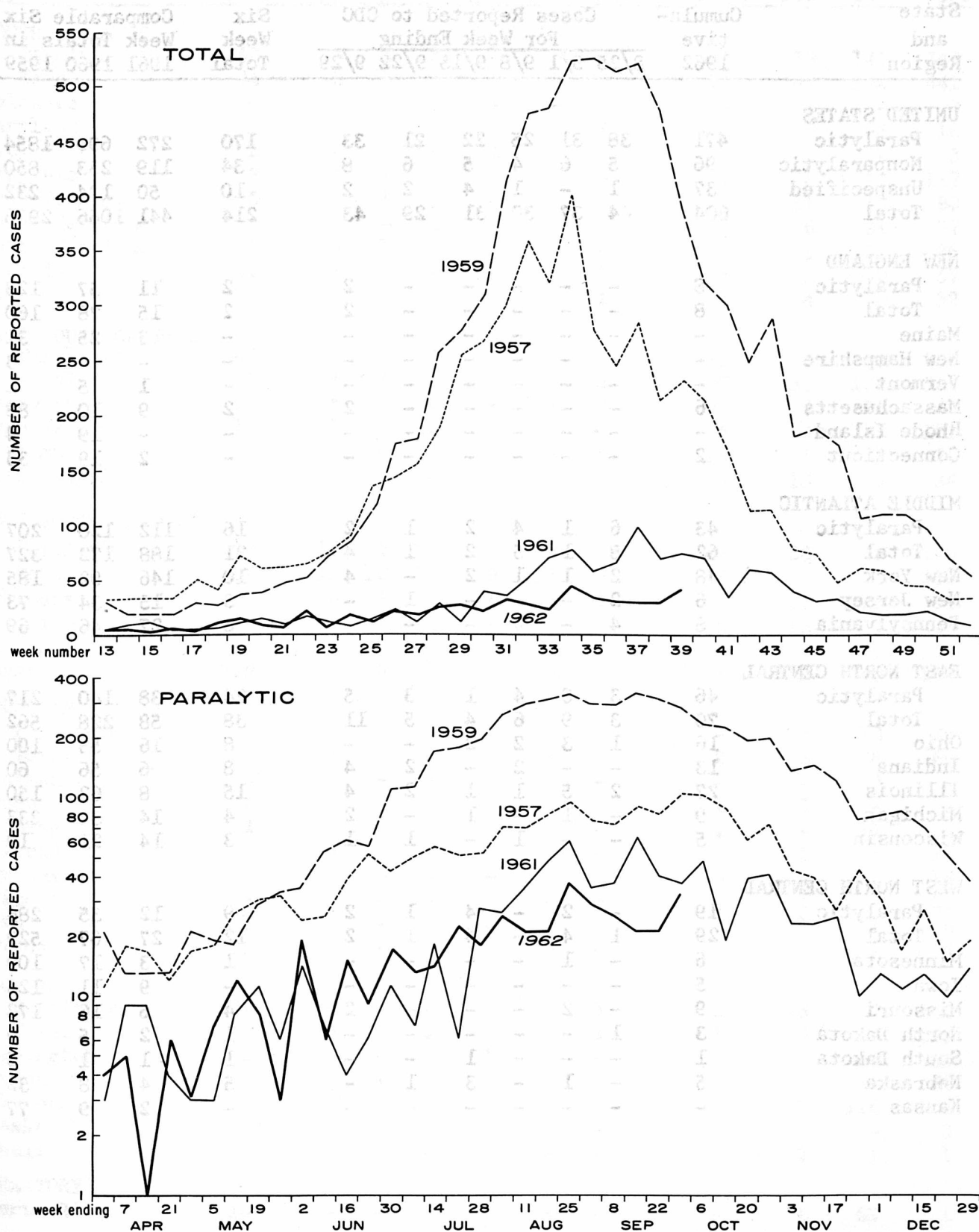


Table 1  
TREND OF 1962 POLIOMYELITIS INCIDENCE

[illegible]

Table 1 (Continued)

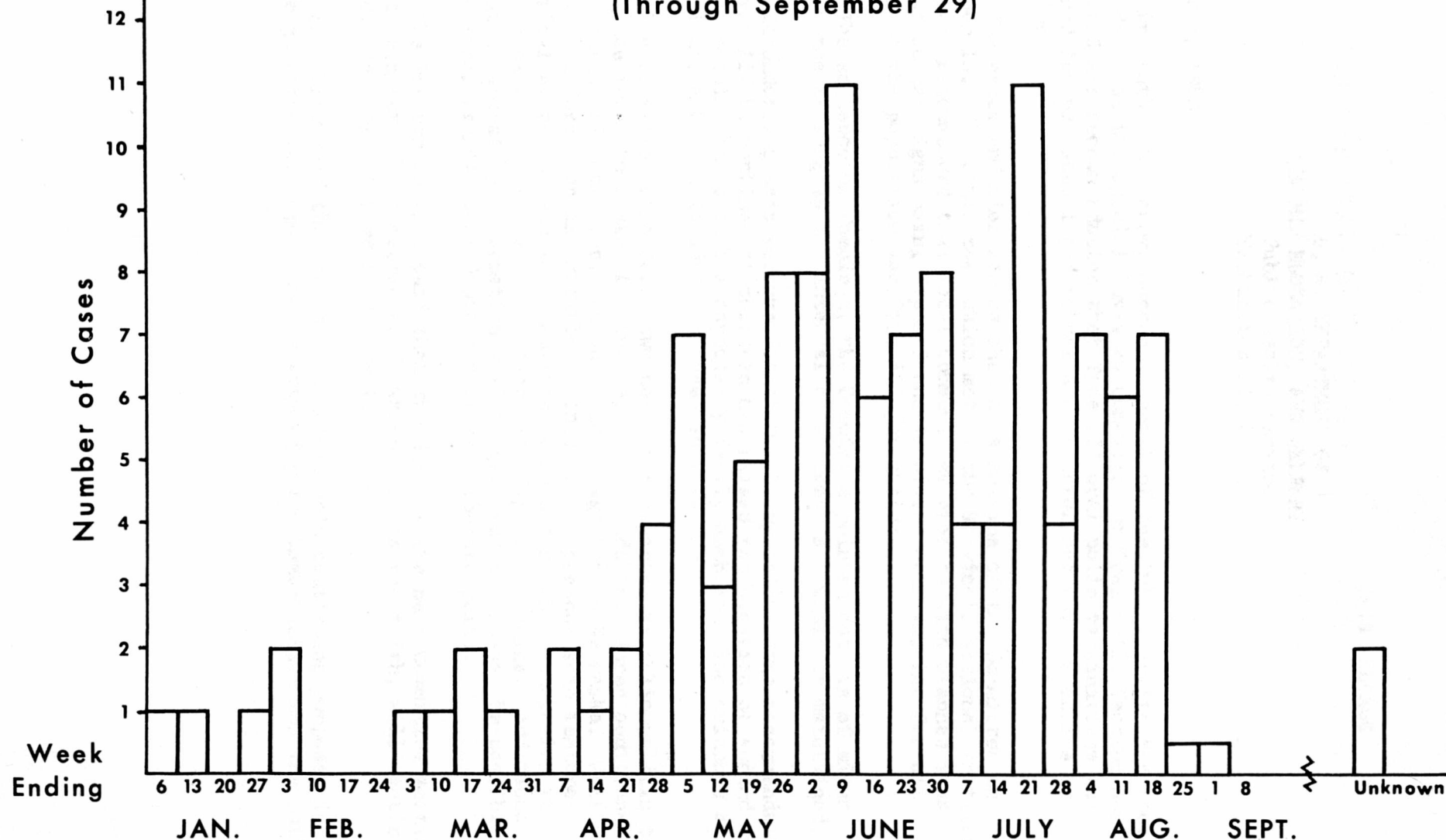
State and Region	Cumula- tive 1962	Cases Reported to CDC For Week Ending							Six Week Total	Comparable Six Weeks Totals In		
		8/25	9/1	9/8	9/15	9/22	9/29	1961		1960	1959	
SOUTH ATLANTIC												
Paralytic	40	3	3	2	1	5	3	17	29	147	343	
Total	44	3	3	2	1	6	3	18	44	184	441	
Delaware	-	-	-	-	-	-	-	-	-	-	3	
Maryland	1	-	-	-	-	-	1	1	8	65	16	
D.C.	2	-	-	-	1	-	-	1	1	-	3	
Virginia	8	1	1	-	-	-	-	2	6	14	117	
West Virginia	5	-	1	1	-	-	-	2	11	18	90	
North Carolina	5	1	-	1	-	1	-	3	6	31	87	
South Carolina	5	-	1	-	-	1	-	2	5	36	36	
Georgia	11	1	-	-	-	4	1	6	3	10	57	
Florida	7	-	-	-	-	-	1	1	4	10	32	
EAST SOUTH CENTRAL												
Paralytic	47	10	5	4	1	4	9	33	20	25	230	
Total	57	11	5	4	4	4	9	37	35	101	315	
Kentucky	22	6	1	1	-	1	4	13	5	71	42	
Tennessee	10	1	-	1	3	-	-	5	14	19	161	
Alabama	22	4	4	2	1	3	5	19	3	5	78	
Mississippi	3	-	-	-	-	-	-	-	13	6	34	
WEST SOUTH CENTRAL												
Paralytic	203	11	7	9	7	7	7	48	20	45	170	
Total	261	12	10	11	9	12	9	63	40	71	269	
Arkansas	11	-	1	-	1	3	2	7	10	12	96	
Louisiana	19	-	-	3	-	4	1	8	15	4	35	
Oklahoma	12	1	1	2	2	-	1	7	-	6	35	
Texas	219	11	8	6	6	5	5	41	15	49	103	
MOUNTAIN												
Paralytic	8	-	-	-	-	-	-	-	2	13	36	
Total	12	1	-	-	1	-	-	2	5	26	60	
Montana	3	-	-	-	-	-	-	-	-	3	1	
Idaho	2	1	-	-	-	-	-	1	2	-	-	
Wyoming	2	-	-	-	1	-	-	1	-	11	-	
Colorado	1	-	-	-	-	-	-	-	1	8	11	
New Mexico	-	-	-	-	-	-	-	-	-	3	14	
Arizona	3	-	-	-	-	-	-	-	1	-	25	
Utah	1	-	-	-	-	-	-	-	1	1	6	
Nevada	-	-	-	-	-	-	-	-	-	-	3	
PACIFIC												
Paralytic	57	5	5	2	6	-	3	21	28	117	240	
Total	61	5	5	2	6	-	3	21	29	139	273	
Washington	2	-	-	-	1	-	-	1	7	11	84	
Oregon	5	-	-	-	-	-	-	-	3	11	59	
California	53	5	5	2	5	-	3	20	17	116	126	
Alaska	-	-	-	-	-	-	-	-	-	-	3	
Hawaii	1	-	-	-	-	-	-	-	2	1	1	
TERRITORY												
Puerto Rico	10	-	-	-	-	-	-	-	1	62	1	

Comparable Six  
Weeks Totals In  
1961 1960 1959





# PARALYTIC POLIOMYELITIS CASES BY WEEK OF ONSET — TEXAS, 1962\* (Through September 29)



\*Reported to the Poliomyelitis Surveillance Unit on individual case records.



NEWS RELEASE

U. S. DEPARTMENT OF  
HEALTH, EDUCATION, AND WELFARE  
Public Health Service  
Washington 25, D. C.

October 2, 1962

Dr. Luther L. Terry, Surgeon General of the Public Health Service, said today that the Special Advisory Committee on Oral Polio Vaccine has reiterated its recommendation that Type III oral polio vaccinations be continued for pre-school and school age children but not for adults at this time.

The recommendation was reached at a meeting of the Committee on September 15. The Committee, which met at the Service's National Institutes of Health, recommended that local communities proceed with planned mass vaccination campaigns using Types I and II of the oral vaccine for all members of the population and Type III for children.

The sequence of feedings, the Committee pointed out, is of minor significance as long as the interval of at least six weeks is maintained.

In endorsing this recommendation Dr. Terry said: "The recommendation that Type III be confined to children has raised the question of spread from vaccinated children to adults especially family members. The evidence does not indicate a hazard to adults exposed in this way."

The Committee considered two new cases reported as poliomyelitis to the Service from the State of Nebraska, both in adults. Three additional suspect cases, all children, are under investigation in Nebraska. While diagnostic information is incomplete, these cases present some features not typical of polio, and the committee could not reach a conclusion at this time as to a possible association with Type III vaccine. Additional diagnostic laboratory information will be gathered to assess the possibility of some other neurological disease that may simulate polio.

The Surgeon General said that the date of the next Committee meeting had not been set. "The meetings, of which this is the fifth, will continue," he said, "as long as there is a need for them."

Dr. Terry said that one of the Committee's continuing purposes is to provide guidance for a positive program of polio immunization for the nation.

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